

ABSTRACT:

A video encoder is usually designed to have a given performance at a given resolution. For example, MPEG2 encoders are known that compress video at '601' resolution (720×576 pixels) into IPPP sequences using 2 MB of RAM. The invention provides the feature of selectably (82a, 82b) encoding images in a lower resolution mode. The spare capacity of resources in the low-resolution mode (e.g. memory capacity and memory bandwidth) is used to improve the performance (e.g. higher image quality, lower bit rate). More particularly, the RAM (81) and motion estimator (9) required for producing P-pictures in the high-resolution mode are arranged (83, 84) to produce B-pictures in the low-resolution mode.

Fig. 1.